In the Claims

1. – 26. (Cancelled)

27. (Currently amended) A method of producing a recombinant virus-like particle that targets specific tissue in a target animal, the method comprising:

(a) providing a viral genome;

(b) isolating viral coat protein sequences that encode for a capsid structure;

(c) inserting at least one first exogenous sequence encoding a protein or peptide of interest into the coat protein sequences, wherein the protein or peptide is antigenic or allergen in the target animal;

(d) inserting at least one second exogenous sequence encoding a tissue-targeting protein sequence in the animal into the coat protein sequences, wherein the expressed targeting protein has affinity for a receptor on tissue in the target animal;

(e) cloning the viral coat protein sequences comprising the first and second exogenous sequences into an appropriate vector; and

(f) transforming a yeast, bacterial or algae host organism for expression of the recombinant virus-like particle.

28. – 29. (Cancelled)

30. (Original) The method of claim 27, wherein more than one first exogenous sequences is inserted.

31. (Previously presented) The method of claim 27, wherein one or more of the second exogenous sequences has the function of targeting the expressed recombinant virus-like particle to a specific location.

32. (Original) The method of claim 27, wherein more than one viral coat protein is isolated.

33. (Currently amended) A recombinant virus-like particle produced by the method of claims 27, ~~28,~~ 29, 30, 31 or 32.

34. (Currently amended) A genetic construct comprising at least one nucleotide sequence encoding at least one viral coat protein, at least one first exogenous sequence encoding for an antigenic or allergenic

protein for displaying on the expressed viral coat protein and at least one second exogenous sequence encoding a tissue-targeting protein for displaying on the expressed viral coat protein, wherein the expressed tissue-targeting protein has the function of targeting the expressed genetic construct to a specific location on tissue in a target animal.

35. (Original) The construct of claim 34, wherein more than one viral coat protein has been modified to display foreign proteins or peptides.

36. (Cancelled)

37. (Original) The construct of claim 34, wherein the exogenous sequence is inserted into a region truncated to remove sequence unnecessary for virus-like particle self-assembly.

38. (Original) The genetic construct of claim 34, wherein the first exogenous sequence is antigenic in an animal.

39. (Original) The genetic construct of claim 34, wherein the first exogenous sequence is allergenic in an animal.

40. (Previously presented) A recombinant virus-like particle produced from the genetic construct of claims 34, 35, 36, 37, 38 or-39.

41. (Withdrawn) A method of using the recombinant virus-like particle of claims 34-39 as a vaccine, comprising: (a) providing the recombinant virus-like particle; and (b) administering it to a subject.

42. (Withdrawn) The method of claim 41, further comprising: (a) infecting an organism with the recombinant virus-like particle of claim 40; and (b) orally feeding the whole biomass of the infected organism to human or non-human animals.

43. (Withdrawn) The method of claim 42, wherein the biomass is processed for uniform dosing.

44. (Withdrawn) The method of claims 41-43, wherein the biomass is freeze dried.

45. (Withdrawn) The method of claims 41-43, wherein the biomass is encapsulated.

46. (Withdrawn) The method of claims 41-46, wherein the vaccine is used as a treatment for allergy.

47. (Withdrawn) The method of claim 41, wherein the vaccine is administered by injection.

48. (Previously presented) A therapeutic tool comprising the recombinant virus-like particles expressed by the constructs of claims 34-39.